

Abstract

Title: The impact of a three-month training on motor functions in preschool hockey players

Objectives: The goal of this diploma thesis is to summarize the knowledge about motor functions in preschool children. Also to find suitable test methods which should help to evaluate the motor level of children this age who are attending the preparation course in the hockey club Sparta Praha and also evaluate the influence of a three month hockey training on postural maturity and development of motor skills on the regular surface and on the ice.

Methods: The pre-experiment was conducted in hockey preparation course HC Sparta Praha in preschool children during their training. It was carried out using 5 tests evaluating postural maturity, which were evaluated by two physiotherapists and 4 tests evaluating the level of motor skills on the regular surface and on the ice, which was measured on time. Tests were performed twice, with a three-month interval.

Results: After three months of training, there was no substantial improvement in postural maturity assessment tests, although the consensus of the two physiotherapists in the assessment of the postural tests maturity was relatively high, for both measurements. The top rated test was tandem walk over the line. In this test, there was also the most improvement during the second measurement. The tandem walk test was also the only test in which the older probands have achieved a better rating comparing to younger probands. In the area of motor skills on the ice has been demonstrated relatively significant improvement in most probands, while the most significant was achieved in those who started to attend the hockey preparation the latest. In contrast, results in a motor skills on regular surface did not show such a substantial improvement comparing to motor skills on the ice.

Keywords: gross motor skills, ice hockey, motor skills, motor tests, motor development, posture, postural maturity, preschool age

